

2001 Early Assessment

National Center for Statistics & Analysis



Motor Vehicle Traffic Crash Fatality and Injury Estimates for 2001

Based on

The Fatality Analysis Reporting System (FARS) and

The National Automotive Sampling System General Estimates System (NASS GES)



The 2001 Early Assessment

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This presentation contains the Early Assessment estimates for motor vehicle traffic crashes in 2001 and the resulting injuries and fatalities. They are compared to estimates from the 2000 Annual Files. These Early Assessment estimates are based on data from the sources indicated in the last slide that for most are incomplete or preliminary. Early Assessment estimates will be superceded by estimates based on data files representing all of 2001 sometime during the summer of 2001.



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► In Motor Vehicle Traffic Crashes:

the Number of Persons Killed remained virtually the same

and the Number Persons Injured decreased slightly



Persons Killed and Injured and Number of Crashes

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	Υe	Year			
	2000	2001	Change		
Persons Killed	41,821	41,730	- 0 . 2 %		
Persons Injured	3,189,000	3,031,000	- 5 . 0 %		
Fatal Crashes	37,409	37,299	- 0 . 3 %		
Nonfatal Crashes	6,356,000	6,320,000	- 0 . 6 %		
Injury Crashes	2,070,000	2,012,000	- 2 . 8 %		
Property - Damage - Only	4,286,000	4,309,000	+ 0 . 5 %		

All NASS GES calculations (sums, differences and percents of change) were computed before rounding and may not appear to correspond to rounded numbers shown in the table.

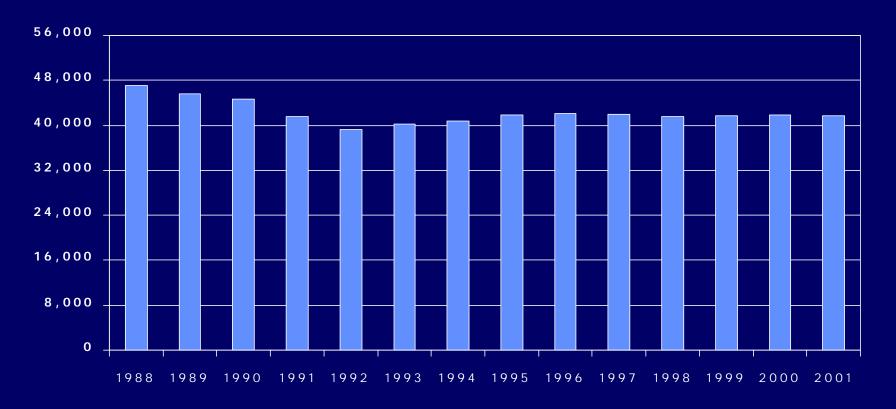
Sources: FARS, NASS GES



Persons Killed, by Year

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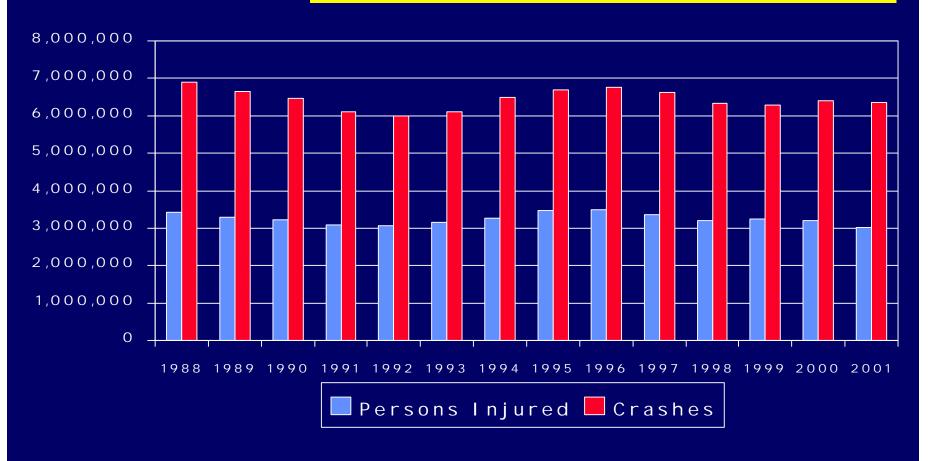




Total Crashes and Persons Injured, by Year

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Sources: NASS GES



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Motor Vehicle Crash Fatality and Injury Rates

remained at historic lows
 or
declined slightly.



Exposure Data

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Exposure	Υ	%	
Measure	2000	2001	Change
Vehicle Miles Traveled	2,749,803M	2,778,015M*	+ 1 . 0 %
Registered Vehicles	217,028,000	220,935,000**	+1.8%
Population	282,124,631	284,796,887	+0.9%

^{*}FHWA's Early VMT Estimate from Dec. 2001 Travel Volume Trends

Sources: FHWA, R.L. Polk, Census Bureau

^{**}Based on NHTSA's Projections



Fatality and Injury Rates

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	Υe		
Rate	2000	2001	% Change
Persons Killed			
/100M VMT	1.52	1.50	- 1 . 2 %
/100K Reg. Vehicles	19.3	18.9*	- 2 . 0 %
/100K Population	14.8	14.7	- 1 . 2 %
Persons Injured			
/100M VMT	116	109	- 5 . 9 %
/100K Reg. Vehicles	1,469	1,372*	-6.6%
/100K Population	1,130	1,064	- 5 . 9 %

^{*} Reg. Vehicles Based on NHTSA's Projections

Sources: FARS, NASS GES, FHWA, and Census Bureau

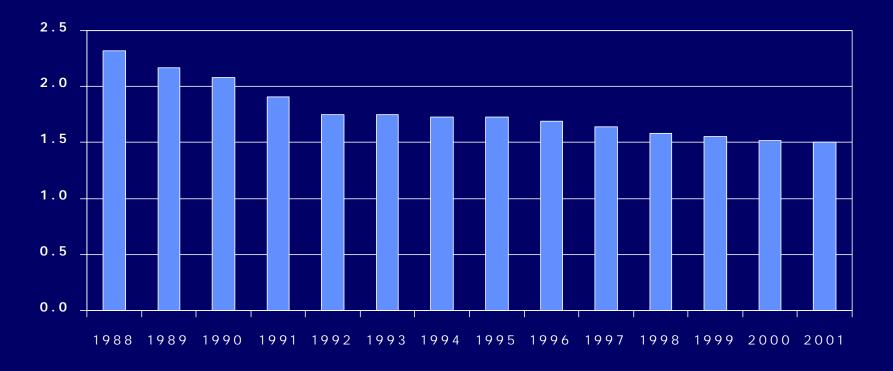


Crash Fatality Rate, by Year

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Persons Killed / 100M VMT

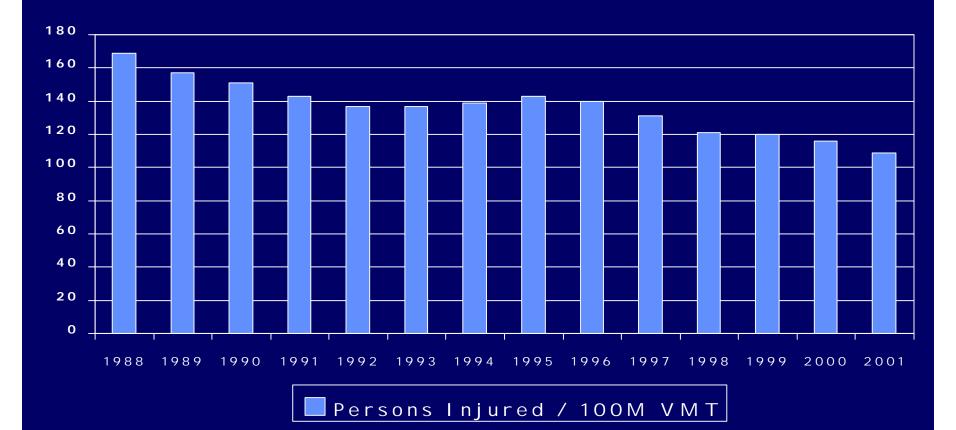
Source: FARS / FHWA VMT



Crash Injury Rates, by Year

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Sources: NASS GES / FHWA VMT



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In Alcohol Related Crashes the Number of Persons Killed
is unchanged from 2000
and
the Number of Persons Injured
declined slightly.



Persons Killed by Highest BAC in Crash

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Highest BAC	Year		%
in Crash	2000	2001	Change
Total Alcohol Related	16,653	16,652	0.0%
% All Fatalities	40%	40%	
Impaired (0.01 <= BAC <= 0.09)	3,761	3,734	- 0 . 7 %
Intoxicated (0.10 <= BAC)	12,892	12,918	+0.2%



Persons Killed and Injured in Alcohol Related Crashes, by Role

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	Yea	%	
Role	2000	2001	Change
Persons Killed	16,653	16,652	0.0%
Drivers	10,216	10,218	0.0%
Passengers	3,892	3,881	- 0 . 3 %
Non Occupants	2,545	2,553	+ 0 . 3 %
Persons Injured	310,000	281,000	-9.5%
Drivers	201,000	183,000	-8.8%
Passengers	98,000	86,000	- 11.5%
Non Occupants	12,000	11,000	- 3 . 5 %

All NASS GES calculations (sums, differences and percents of change) were computed before rounding and may not appear to correspond to rounded numbers shown in the table.

Sources: FARS, NASS GES

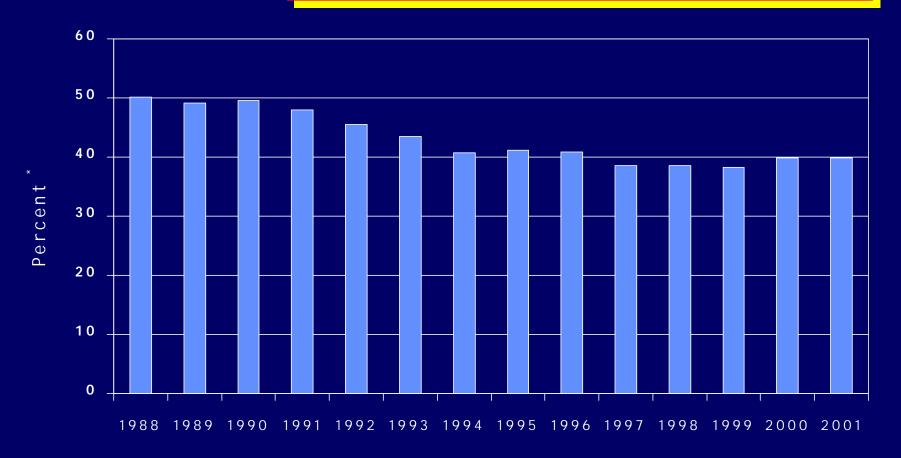


Percent Alcohol-Related Traffic Crash Fatalities of Total Fatalities, by Year

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Rounded to the tenth decimal



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Number of Vehicle Occupant Fatalities was essentially unchanged ...

But mix continued changing ...

Decreasing for

Large Trucks

Increasing for

Motorcycle Riders



Vehicle Occupants Killed by Type of Vehicle

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	Υe	%	
Type of Vehicle	2000	2001	Change
Passenger Cars	20,492	20,269	- 1 . 1 %
L T V s	11,418	11,564	+ 1 . 3 %
Motorcycles	2,862	3,067	+7.2%
Large Trucks	7 4 1	696	- 6 . 1 %
Other Vehicles*	420	406	- 3 . 4 %
Unknown Vehicle Type	316	204	- 35.5%
TOTAL	36,249	36,206	- 0 . 1 %

^{*}Includes vehicle occupant fatalities in buses and other, e.g., farm equipment, construction equipment, etc., vehicle types.



Vehicle Occupants Injured by Type of Vehicle

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	Y e	%	
Type of Vehicle	2000	2001	Change
Passenger Cars	2,052,000	1,965,000	-4.2%
LTV's	887,000	840,000	- 5 . 3 %
Motorcycles	58,000	59,000	+ 2 . 0 %
Large Trucks	31,000	32,000	+ 5 . 3 %
Other Vehicles*	28,000	27,000	- 3 . 7 %
TOTAL	3,055,000	2,923,000	- 4 . 3 %

 $^{{}^{\}star}$ Includes vehicle occupants injured in buses and other vehicle types.

All NASS GES calculations (sums, differences and percents of change) were computed before rounding and may not appear to

correspond to rounded numbers shown in the table.

Source: NASS GES



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A Closer Look at the Increase in Motorcycle Rider Fatalities



Motorcyclist Fatalities account for most of increase in Fatalities from 1997 to 2001

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Total vs. Motorcyclist Fatalities

by Year, 1997-2001

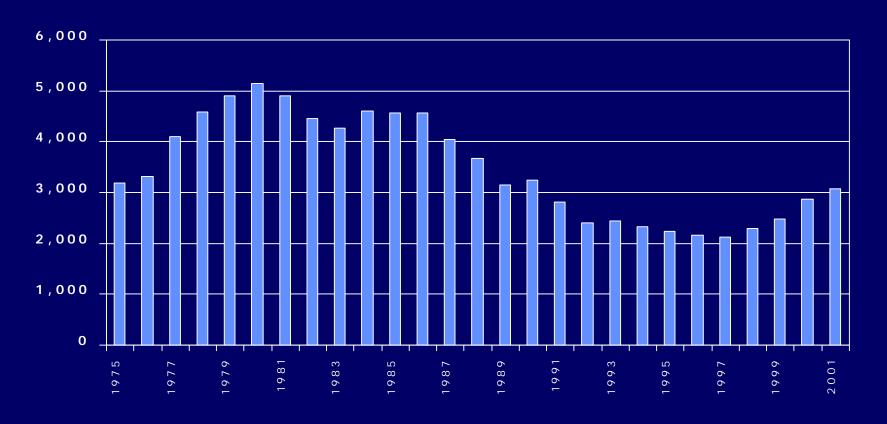
	Year					
Fatalities	1997	1998	1999	2000	2001	
Total	42,013	41,501	41,717	41,821	41,730	
Change		- 5 1 2	+ 2 1 6	+ 1 0 4	- 9 1	
Motorcyclists	2,116	2,294	2,483	2,862	3,067	
Change		+ 1 7 8	+ 189	+ 3 7 9	+ 2 0 5	
Percent of all Fatalities	5.0	5.5	6.0	6.8	7.3	



Motorcycle Riders Killed by Year

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Motorcyclist Fatality Rates are Increasing

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Motorcyclist Fatality Rates, by Year					
	Year				
Rate	1997	1998	1999	2000	2001
Persons Killed	2,116	2,294	2,483	2,862	3,067
/100M VMT*	21.0	22.3	23.5	27.3	
/100K Population	0.79	0.85	0.91	1.01	1.08
/100K Reg. Mcycles*	55.3	59.1	59.8	65.9	

Sources: FARS, FHWA, and Census Bureau

^{*} Registration and VMT data not available for 2001.



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The Number of Persons Killed or Injured

in crashes involving

Large Trucks

continued it's recent decline.



Persons Killed in Large Truck Crashes, by Type

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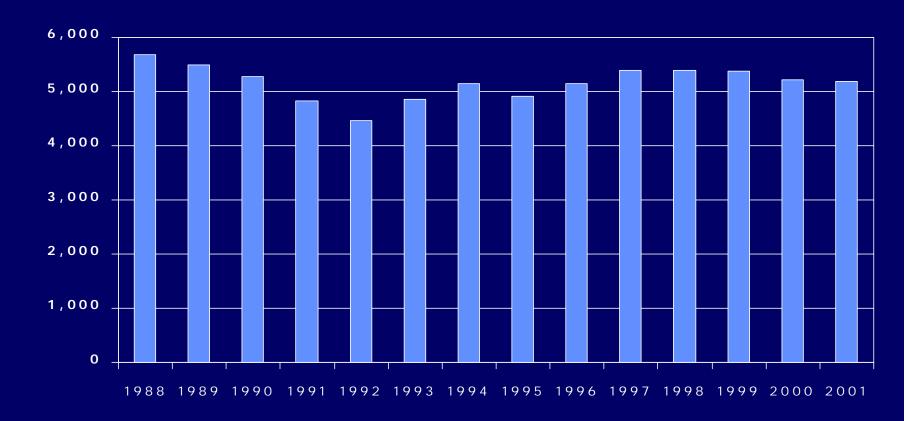
	Year		
Туре	2000	2001	% Change
Truck Occupants	741	696	- 6 . 1 %
Single Vehicle	480	464	- 3 . 4 %
Multiple Vehicle	261	232	- 11.0%
Other Vehicle Occupants	4,060	4,053	-0.2%
Non-Occupants	410	443	+8.0%
Total	5,211	5,192	- 0 . 4 %



Persons Killed in Large Truck Crashes, by Year

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Persons Injured in Large Truck Crashes, by Type

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	Υe		
Туре	2000	2001	% Change
Truck Occupants	31,000	32,000	+ 5 . 3 %
Single Vehicle	16,000	16,000	- 2 . 4 %
Multiple Vehicle	14,000	16,000	+14.1%
Other Vehicle Occupants	106,000	96,000	- 9 . 3 %
Non-Occupants	3,000	3,000	- 9 . 6 %
Total	140,000	131,000	- 6 . 1 %

All NASS GES calculations (sums, differences and percents of change) were computed before rounding and may not appear to correspond to rounded numbers shown in the table.

Source: NASS GES



Persons Injured in Large Truck Crashes, by Year

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Source: NASS GES



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Most passenger vehicle occupants killed in motor vehicle crashes continue to be unrestrained.



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Passenger Vehicle Occupant Fatalities (All Ages), by Restraint Use*

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	Year			
Restraint Use	200	0	200	1
Persons Killed	31,910	100%	31,833	100%
Restraint Used**	12,660	40%	12,825	40%
Restraint Not Used	19,250	60%	19,008	60%

^{*}Occupant Fatalities whose restraint use was unknown were distributed proportionally to the known use categories.

In both years restraint use was unknown for 8% of passenger vehicle occupants.

^{**} Restraint Used = Use of any type of restraint, e.g., lap belt, lap/shoulder belt, child safety seat, etc.



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Pedalcyclists and other

Non-Occupants killed or

injured were

virtually unchanged.



Non-Occupants Killed or Injured, by Role

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	Year		%
Role	2000	2001	Change
Persons Killed	5,572	5,524	- 0 . 9 %
Pedestrians	4,739	4,698	- 0 . 9 %
Pedalcyclists	690	701	+ 1 . 6 %
Others *	143	125	- 12.5%
Persons Injured	134,000	133,000	- 1 . 0 %
Pedestrians	78,000	77,000	- 0 . 4 %
Pedalcyclists	51,000	46,000	- 9 . 3 %
Others *	5,000	9,000	+ 7 1 %

 $^{^{*}}$ Includes occupants of motor vehicles not in transport $\,$ and of non-motor vehicle transport devices.

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correspond to rounded numbers shown in the table.

Source: FARS, NASS GES



Pedestrians and Pedalcyclists Killed, by Year

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Fatalities and Injuries for Children Ages 0 - 15 declined.



Children, Under Age 5, Killed or Injured, by Role

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	Year		%
Role	2000	2001	Change
Killed	706	668	- 5 . 4 %
Occupants	5 3 9	5 3 2	- 1 . 3 %
Non Occupants	167	136	- 18.8%
Injured	71,000	65,000	- 8 . 6 %
Occupants	67,000	61,000	-8.8%
Non Occupants	3,000	3,000	- 4 . 6 %

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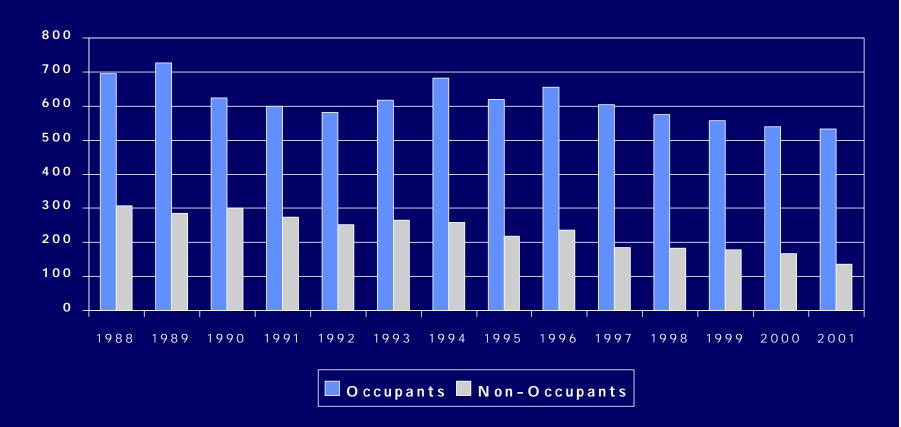
Source: FARS, NASS GES



Children Under Age 5, Killed, by Year and Role

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Children and Youth, Ages 5-15, Killed or Injured, by Role

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	Year		%
Role	2000	2001	Change
Killed	2,105	1,990	- 5 . 5 %
Occupants	1,533	1,425	- 7 . 1 %
Non Occupants	572	566	- 1 . 1 %
Injured	261,000	246,000	- 5 . 8 %
Occupants	218,000	205,000	- 6 . 0 %
Non Occupants	43,000	41,000	- 4 . 3 %

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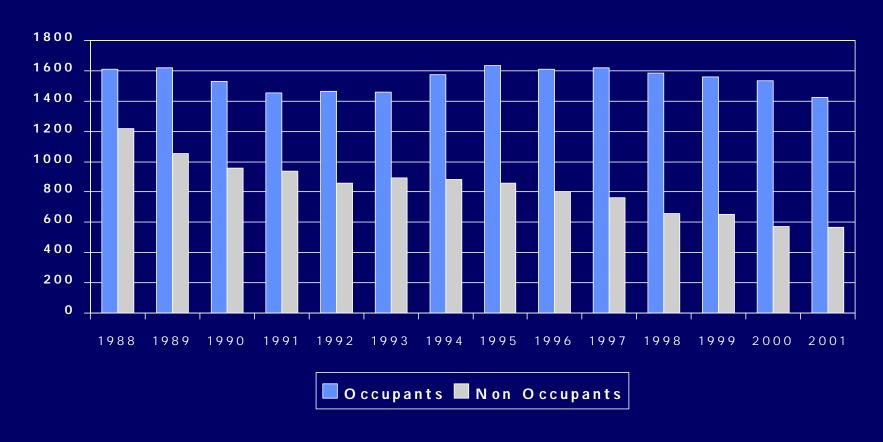
Source: FARS, NASS GES



Children and Youth (Ages 5-15) Fatalities, by Year and Role

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Crashes and Fatalities involving Young Drivers decreased slightly.



Number of Crashes and Persons Killed in Crashes Involving Young Drivers (Ages 16-20)

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Crashes or	rYear		
Persons Killed	2000	2001	% Change
Crashes	1,683,000	1,656,000	- 1 . 6 %
Fatal	7,607	7,547	- 0 . 8 %
Injury	569,000	547,000	- 3 . 9 %
P D O	1,106,000	1,101,000	- 0 . 5 %
Persons Killed	8,811	8,791	- 0 . 2 %
Young Drivers	3,502	3,505	+0.1%
Passengers*	2,418	2,429	+ 0 . 5 %
Others	2,891	2,857	- 1 . 2 %

^{*}In vehicles with young drivers

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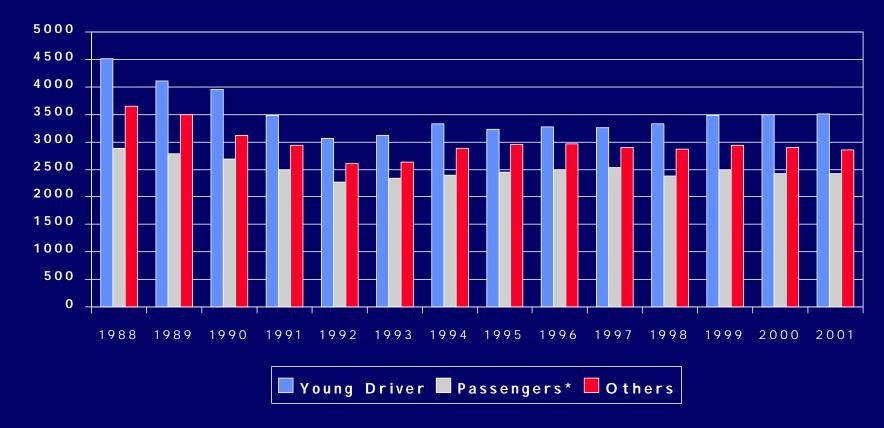
Source: FARS, NASS GES



Persons Killed in Crashes Involving Young Drivers (Ages 16-20), by Year and Role

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*In vehicles with young drivers



Data Sources

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- Crash Data
 - ♦ Fatality Analysis Reporting System (FARS)
 - ° 2000 (and prior years, Final File) Annual File
 - 2001 Early Assessment File
 - ♦ NASS General Estimates System (GES)
 - ° 2000 (and prior years) Annual File
 - ° 2001 Three Quarter Year File
- Exposure Data
 - ♦ Vehicle Miles of Travel (VMT)
 - Federal Highway Administration (FHWA)
 - O December 2001 Traffic Volume Trends Report
 - ♦ Population Projection (based on 2000 Census)
 - ° Census Bureau
 - ♦ Registered Vehicles
 - NHTSA's Projection for 2001
 - Based on FHWA Registered Vehicles



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Questions about the data in this report may be sent by E-Mail to:

ncsaweb@nhtsa.dot.gov

or

made by phone to: 1.800.934.8517